

Amendments to the Claims:

Please make the following amendments to the claims (material to be inserted is in underline, and material to be deleted is in [brackets and strikeout]).

21. (New) A needle-less injection device, comprising:

a liquid container having an outlet orifice;

an injection orifice fluidly coupled with the outlet orifice and configured to inject liquid forwardly out of the needle-less injection device substantially along an injection axis into an injection site;

a plug member displaceable from a first position, in which it sealingly closes the outlet orifice, to a second position, in which liquid is permitted to flow out of the outlet orifice; and

plural bypass conduits defined between the outlet orifice of the liquid container and the injection orifice when the plug member is in the second position, such that the bypass conduits permit liquid to flow from the outlet orifice past the plug member to the injection orifice,

where the bypass conduits have outer walls with terminal forward end portions that are streamlined and extend at acute angles relative to a portion of the injection axis extending rearwardly of the terminal forward end portions, to inhibit turbulence occurring between the plug member and the injection orifice.

22. (New) The device of claim 21, where the terminal forward end portions of the outer walls of the bypass conduits are located forward of the plug member when the plug member is in the second position.

23. (New) The device of claim 22, where the plug member moves forwardly along the injection axis when displaced from the first position to the second position.

24. (New) The device of claim 22, where the bypass conduits converge forwardly of the plug member when the plug member is in the second position, such that streams of liquid flowing past the plug member through the bypass conduits converge into a single stream between the plug member and the injection orifice.

25. (New) The device of claim 21, further comprising a chamber fluidly coupling the outlet orifice with the injection orifice, and a plurality of ribs extending radially inward from an inward facing wall surface that defines the chamber.

26. (New) The device of claim 25, where the bypass conduits are defined by the ribs, inward facing wall surface of the chamber, and by the plug member when the plug member is in the second position.

27. (New) The device of claim 26, where the plug structure moves forward along the injection axis when displaced from the first position to the second position, and where the ribs are configured to block the plug member from further forward movement toward the injection orifice when the plug member is in the second position.

28. (New) A needle-less injection device, comprising:
a liquid container having an outlet orifice;
an injection orifice fluidly coupled with the outlet orifice and configured to inject
liquid forwardly out of the needle-less injection device substantially along an injection
axis into an injection site;
a plug member displaceable from a first position, in which it sealingly closes the
outlet orifice, to a second position, in which liquid is permitted to flow out of the outlet
orifice; and
a chamber interposed between and fluidly coupling the outlet orifice with the
injection orifice, the chamber being adapted to receive and hold the plug member when
the plug member is displaced to the second position, so that the plug member does not
prevent liquid from flowing from the outlet orifice to the injection orifice,
where plural bypass conduits are defined within the chamber such that, when the
plug member is in the second position, the bypass conduits permit liquid to flow from the
outlet orifice past the plug member to the injection orifice,
and where each bypass conduit has an outer wall that extends non-perpendicularly
relative to the injection axis along an entire length of the bypass conduit.

29. (New) The device of claim 28, where for each bypass conduit, the outer
wall has a terminal forward end portion that is streamlined and extends at an acute angle
relative to a portion of the injection axis extending rearwardly of the terminal forward
end portion, to inhibit turbulence occurring between the plug member and the injection
orifice.

30. (New) The device of claim 29, where for each bypass conduit, the terminal forward end portion of the outer wall is located forward of the plug member when the plug member is in the second position.

31. (New) The device of claim 30, where the plug member moves forwardly along the injection axis when displaced from the first position to the second position.

32. (New) The device of claim 30, where the bypass conduits converge forwardly of the plug member when the plug member is in the second position, such that streams of liquid flowing past the plug member through the bypass conduits converge into a single stream between the plug member and the injection orifice.

33. (New) The device of claim 29, where the chamber includes a plurality of ribs extending radially inward toward the injection axis.

34. (New) The device of claim 33, where the bypass conduits extend between the ribs and are defined in part by the ribs.

35. (New) The device of claim 34, where the plug member moves forward along the injection axis when displaced from the first position to the second position, and where the ribs are configured to block the plug member from further forward movement toward the injection orifice when the plug member is in the second position.

36. (New) A needle-less injection device, comprising:
a liquid container having an outlet orifice;
an injection orifice fluidly coupled with the outlet orifice and configured to inject
liquid forwardly out of the needle-less injection device substantially along an injection
axis into an injection site; and
a plug member displaceable from a first position, in which it sealingly closes the
outlet orifice, to a second position, in which liquid is permitted to flow out of the outlet
orifice,

where the plug member contacts a plug capture structure when in the second
position, and where plural bypass conduits are formed in the plug capture structure to
permit liquid to flow from the outlet orifice past the plug member to the injection orifice,
and where the bypass conduits have outer walls with terminal forward end portions that
are streamlined and extend at acute angles relative to a portion of the injection axis
extending rearwardly of the terminal forward end portions, to inhibit turbulence occurring
between the plug member and the injection orifice.

37. (New) A needle-less injection device, comprising:
a container having an outlet orifice;
an injection orifice configured to inject liquid forwardly out of the needle-less
injection device substantially along an injection axis into an injection site; and
a plug member displaceable from a first position, in which it sealingly closes the
outlet orifice, to a second position, in which liquid is permitted to flow out of the outlet
orifice and to the injection orifice,
where, in the second position, the plug member abuts a plug capture structure
disposed between the outlet orifice and the injection orifice, and
where a plurality of bypass conduits are formed in the plug capture structure to
permit liquid to flow from the outlet orifice around the plug member along a plurality of
bypass flowpaths that converge forwardly of the plug member between the plug member
and the injection orifice, each bypass conduit being shaped so that, liquid emerging from
the bypass conduit into where the bypass flowpaths converge flows in an acute direction
relative to a portion of the injection axis extending rearwardly from where the bypass
flowpaths converge.